



# UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE  
United States Patent and Trademark Office  
Address: COMMISSIONER FOR PATENTS  
P.O. Box 1450  
Alexandria, Virginia 22313-1450  
[www.uspto.gov](http://www.uspto.gov)

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/732,002	12/09/2003	Shiva Aditham	5038-311	5864
32231	7590	08/14/2007	EXAMINER	
MARGER JOHNSON & MCCOLLOM, P.C. 210 SW MORRISON STREET, SUITE 400 PORTLAND, OR 97204			BONURA, TIMOTHY M	
		ART UNIT	PAPER NUMBER	
		2114		
		MAIL DATE	DELIVERY MODE	
		08/14/2007	PAPER	

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

<b>Office Action Summary</b>	<b>Application No.</b>	<b>Applicant(s)</b>	
	10/732,002	ADITHAM, SHIVA	
	<b>Examiner</b>	<b>Art Unit</b>	
	Tim Bonura	2114	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

#### Status

- 1) Responsive to communication(s) filed on 21 May 2007.
- 2a) This action is **FINAL**.                    2b) This action is non-final.
- 3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

#### Disposition of Claims

- 4) Claim(s) 1-24 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) Claim(s) \_\_\_\_\_ is/are allowed.
- 6) Claim(s) 1,2,4-8,11-14,16-20,23 and 24 is/are rejected.
- 7) Claim(s) 3,9,10,15,21 and 22 is/are objected to.
- 8) Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

#### Application Papers

- 9) The specification is objected to by the Examiner.
- 10) The drawing(s) filed on 09 December 2003 is/are: a) accepted or b) objected to by the Examiner.  
 Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
 Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

#### Priority under 35 U.S.C. § 119

- 12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
  - a) All    b) Some \* c) None of:
    1. Certified copies of the priority documents have been received.
    2. Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
    3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

#### Attachment(s)

- |  |   |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892)                     | 4) <input type="checkbox"/> Interview Summary (PTO-413)           |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ .                                    |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)          | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date _____ .  | 6) <input type="checkbox"/> Other: _____ .                        |

#### DETAILED ACTION

- **Claims 1-2, 4-8, 11-14, 16-20, and 23-24 are rejected under 35 U.S.C. 102(e) as being anticipated by Litt, U.S. Patent Number 7,051,239.**

#### ***Claim Rejections - 35 USC § 102***

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

2. Claims 1-2, 4-8, 11-14, 16-20, and 23-24 are rejected under 35 U.S.C. 102(e) as being anticipated by Litt, U.S. Patent Number 7,051,239.

3. Regarding claim 1:

a. Regarding the limitation of “intercepting data packets,” Litt discloses a system that can receive enable signals. (Lines 29-31 of Column 10).

b. Regarding the limitation of “creating error conditions responsive to the intercepting; transmitting the error conditions” Litt discloses a system that can test a process over bus lines with an OCLA used to test data on a cache over a bus. (Lines 28-38 of Column 8).

c. Regarding the limitation of “monitoring a response to the error conditions,” Litt discloses a system with a monitor of the results of the test data from the OCLA to the device under test. (Lines 45-55 of Column 8).

4. Regarding claim 2, Litt discloses a system with ability to test bus routing of data from the OCLA to the cache. (Lines 40-56 of Column 11).

5. Regarding claim 4, Litt discloses a system wherein data is sent to an OCLA and receiving data and filtering it so it can be used in the debug mode. (Lines 36-45 of Column 8).
6. Regarding claim 5, Litt discloses a system wherein data is sent from an OCLA and receiving data, filtering it, and using it to determine operational status of the system. (Lines 45-55 of Column 8).
7. Regarding claim 6, Litt discloses a system in which the results from the monitoring are used to determine the operational function of the processor. (Lines 51-54 of Column 4).
8. Regarding claim 7:
  - d. Regarding the limitation of "intercepting data packets," Litt discloses a system that can receive enable signals. (Lines 29-31 of Column 10).
  - e. Regarding the limitation of "creating error conditions responsive to the intercepting; transmitting the error conditions" Litt discloses a system that can test a process over bus lines with an OCLA used to test data on a cache over a bus. (Lines 28-38 of Column 8).
  - f. Regarding the limitation of "monitoring a response to the error conditions," Litt discloses a system with a monitor of the results of the test data from the OCLA to the device under test. (Lines 45-55 of Column 8).
9. Regarding claim 8, Litt discloses a system with ability to test bus routing of data from the OCLA to the cache. (Lines 40-56 of Column 11).
10. Regarding claim 11, Litt discloses a system wherein data is sent from an OCLA and receiving data, filtering it, and using it to determine operational status of the system. (Lines 45-55 of Column 8).
11. Regarding claim 12, Litt discloses a system in which the results from the monitoring are used to determine the operational function of the processor. (Lines 51-54 of Column 4).

12. Regarding claim 13:

- g. Regarding the limitation of "a processor," Litt discloses a processor core. (Lines 18-20 of Column 4).
- h. Regarding the limitation of "a plurality of end points," Litt discloses a plurality of cache sets. (Lines 18-20 of Column 4).
- i. Regarding the limitation of "a bridge capable of facilitating communication between the processor and the plurality of end points; a switch capable of switching between the plurality of endpoints," Litt discloses a system with an OCLA that can communicate between the CPU cores and the cache. (Lines 33-36 of Column 7 and Lines 3-6 of Column 8). The OCLA can store data in any of the cache sets under test. (Lines 12-15 of Column 5).
- j. Regarding the limitation of "intercepting data packets," Litt discloses a system that can receive enable signals. (Lines 29-31 of Column 10).
- k. Regarding the limitation of "creating error conditions responsive to the intercepting; transmitting the error conditions" Litt discloses a system that can test a process over bus lines with an OCLA used to test data on a cache over a bus. (Lines 28-38 of Column 8).
- l. Regarding the limitation of "monitoring a response to the error conditions," Litt discloses a system with a monitor of the results of the test data from the OCLA to the device under test. (Lines 45-55 of Column 8).

13. Regarding claim 14, Litt discloses a system with ability to test bus routing of data from the OCLA to the cache. (Lines 40-56 of Column 11).

14. Regarding claim 16, Litt discloses a system wherein data is sent to an OCLA and receiving data and filtering it so it can be used in the debug mode. (Lines 36-45 of Column 8).

15. Regarding claim 17, Litt discloses a system wherein data is sent from an OCLA and receiving data, filtering it, and using it to determine operational status of the system. (Lines 45-55 of Column 8).
16. Regarding claim 18, Litt discloses a system in which the results from the monitoring are used to determine the operational function of the processor. (Lines 51-54 of Column 4).
17. Regarding claim 19:
  - m. Regarding the limitation of "intercepting data packets," Litt discloses a system that can receive enable signals. (Lines 29-31 of Column 10).
  - n. Regarding the limitation of "creating error conditions responsive to the intercepting; transmitting the error conditions" Litt discloses a system that can test a process over bus lines with an OCLA used to test data on a cache over a bus. (Lines 28-38 of Column 8).
  - o. Regarding the limitation of "monitoring a response to the error conditions," Litt discloses a system with a monitor of the results of the test data from the OCLA to the device under test. (Lines 45-55 of Column 8).
18. Regarding claim 20, Litt discloses a system with ability to test bus routing of data from the OCLA to the cache. (Lines 40-56 of Column 11).
19. Regarding claim 23, Litt discloses a system wherein data is sent from an OCLA and receiving data, filtering it, and using it to determine operational status of the system. (Lines 45-55 of Column 8).
20. Regarding claim 24, Litt discloses a system in which the results from the monitoring are used to determine the operational function of the processor. (Lines 51-54 of Column 4).

***Response to Arguments***

21. Applicant's arguments filed 05/21/2007 have been fully considered but they are not persuasive.
22. Regarding the arguments for claims 1 and 13:
  - p. The applicant argues that the prior art of Litt does not disclose or teach the "creating error conditions responsive to the intercepting," however, then the applicant argues the Litt instead does not teach or suggest "creating error conditions in the data read from the cache memory." (See page 6 of response last paragraph). The examiner would first like to point out that the argument of Litt not teaching or suggesting "creating error conditions in the data read from the cache memory" is not recited in the claims and is thereby rendered moot. Regarding the first argument, Litt does not disclose or teach the "creating error conditions responsive to the intercepting," the examiner disagrees with the applicant, and contends that Litt does teach this limitation upon a board and reasonable reading of the claims. The examiner contends that the Litt teaches the limitation as recited in the claims at the above stated rejection (Lines 28-38 of Column 8) and furthermore, Litt discloses a system a debug mode that can read data that is received by a OCLA in a cache memory. (Lines 50-60 of Column 7). Litt also disclose that the OCLA can filter state data that is received to determine a state. (Lines 35-45 of Column 7). Both of these discloses of Litt, viewed in light of the claimed limitation, read of the claims in the examiners opinion.
23. Regarding the arguments for claims 2, 8, 14, and 20,
  - q. The applicant argues that Litt does not disclose, "dropping selected data packets," and then the applicant goes onto state that this was discussed previously. (The examiners view this to mean as discussed in the remarks on claims 1 and 13). The

examiner wishes to point the applicant back to the response if claim 1 and to further view the passage of Litt disclosing that the OCLA can filter state data that is received to determine a state. (Lines 35-45 of Column 7).

24. Regarding the arguments for claims 3, 9, 15, and 21:
  - r. The examiner agrees with the applicant, rejections have been removed.
25. Regarding the arguments for claims 5 and 17:
  - s. The examiner contends that a "history buffer" as disclosed by Litt and a trace buffer as claimed would be equivalent as both are buffers for data.
26. Regarding the arguments for claims 7 and 19:
  - t. Applicant's arguments fail to comply with 37 CFR 1.111(b) because they amount to a general allegation that the claims define a patentable invention without specifically pointing out how the language of the claims patentably distinguishes them from the references.
27. Regarding the arguments for claims 10 and 22:
  - u. The examiner agrees with the applicant, rejections have been removed.

#### ***Allowable Subject Matter***

28. Claims 3, 9-10, 15, and 21-22 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

#### ***Conclusion***

29. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

30. Any inquiry concerning this communication or earlier communications from the examiner should be directed to **Tim Bonura**.

- The examiner can normally be reached on **Mon-Fri: 8:30-5:00**.
- The examiner can be reached at: **571-272-3654**.

31. If attempts to reach the examiner by telephone are unsuccessful, please contact the examiner's supervisor, **Scott Baderman**.

- The supervisor can be reached on **571-272-3644**.

32. The fax phone numbers for the organization where this application or proceeding is assigned are:

- **703-872-9306 for all patent related correspondence by FAX.**

33. Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov/>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Art Unit: 2114

34. Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the **receptionist** whose telephone number is: **571-272-2100**.

35. Responses should be mailed to:

o **Commissioner of Patents and Trademarks**

**P.O. Box 1450**

**Alexandria, VA 22313-1450**

tmb

August 8, 2007



SCOTT BADERMAN  
SUPERVISORY PATENT EXAMINER